

REMARKS

In response to the Patent Office Action of December 20, 2005, the applicant respectfully requests re-examination and re-consideration. To further the prosecution of this application all of the independent claims except claim 22, and some dependent claims, rejected by the Examiner have now been canceled; added dependent claims are based on allowable subject matter in independent claims; added independent claims are believed to present subject matter related to allowed claim subject matter and dependent claims indicated by the Examiner as containing allowable subject matter have been amended into independent form.

Claims 21, 24, 25, 27 and 29-31 have been indicated by the Examiner as allowed. Claims 5-7, 9, 13-18 and 20 have only been objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Incidentally, claim 20 is an independent claim and thus the applicant assumes that the Examiner meant to allow that claim directly.

In the instant action on page 2 the Examiner has rejected claims 1-4, 8, and 10-12 under 35 U.S.C. 102(b) as anticipated by the Aust et al US Patent No. 5,454,827. As all of these claims have now been canceled by this amendment, this rejection is now overcome and is thus moot.

On page 2 of the instant action the Examiner has also rejected claim 22 under 35 U.S.C. 102(b) as anticipated by the Williamson et al US Patent No. 5,405,344. Claim 22 has been further amended and the applicant submits arguments later in this response regarding the allowability of claim 22.

On page 3 of the instant action the Examiner has also rejected claims 19, 23, 26 and 28 under 35 U.S.C. 103(a) as unpatentable over Aust et al '827 and further in view of Wilk US Patent No. 5,273,026 and/or Wales US Patent No. 5,702,408. Claims 19, 23, 26 and 28 have also been canceled and thus this rejection is also now moot.

Claim 5, indicated as containing allowable subject matter by the Examiner, has been amended into independent form and is thus now clearly in condition for allowance. Claims 6 and 7 that are dependent to claim 5 are thus also in condition for allowance. In addition the applicant has added related claims 32-41 which are believed to be allowable for the same reason that claims 5-7 were indicated as allowable by the Examiner. The independent claim 32 contains virtually all the same limitations as claim 5 except that it defines the bending stiffness of the movable members as being “different”. Claims 33-41 are dependent claims to claim 32. All of these claims should be found allowable by the Examiner.

Claim 9, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 42-48 that are dependent to claim 9 and are thus also in condition for allowance.

Claim 13, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 49-57 that are dependent to claim 13 and are thus also in condition for allowance. In addition the applicant has added related claims 58-66 which are believed to be allowable for the same reason that claim 13 was indicated as allowable by the Examiner. The independent claim 58 contains the substantive limitations as amended claim 13. Accordingly, claims 58-66 should be found allowable by the Examiner.

Claim 14, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 67-74 that are dependent to claim 14 and are thus also in condition for allowance. In addition the applicant has added related claims 75-82 which are believed to be allowable for the same reason that claim 14 was indicated as allowable by the Examiner. The independent claim 75 contains the substantive limitations as amended claim 14. Accordingly, claims 75-82 should be found allowable by the Examiner.

Claim 15, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 83-91 that are dependent to claim 15 and are thus also in condition for allowance.

Claim 16, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 92-100 that are dependent to claim 16 and are thus also in condition for allowance.

Claim 17, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 101-108 that are dependent to claim 17 and are thus also in condition for allowance.

Claim 18, indicated as containing allowable subject matter by the Examiner, has been amended into independent form including at least all of the limitations of original claim 1 and is thus now clearly in condition for allowance. The applicant has also added claims 109-123 that are dependent to claim 18 and are thus also in condition for allowance.

Claim 20 has been indicated as containing allowable subject matter. Thus, the added dependent claims 124-130 should now all be found in condition for allowance.

Claim 21 has been allowed. The added dependent claims 131-141 should thus also be in condition for allowance.

Claim 22 has been rejected under 35 U.S.C. 102(b) as anticipated by the Williamson et al US Patent No. 5,405,344. Claim 22 has been further amended and with these amendments and the following arguments claim 22 should be found in allowable condition. Dependent claims 142-149 added by this response should also be found in condition for allowance.

In rejecting claim 22 the Examiner stated that Williamson discloses “a shaft 94, a tool 60, a control handle, a proximal motion member 230, a distal motion member 184, actuation means 274 and wheel 236”. Williamson’s wheel 236, identified by the Examiner, is actually a “gear”, such as illustrated in FIG. 9. Also, the Examiner has identified the claimed “proximal motion member” as the rotatable drive sleeve 230 and, separately, the claimed “rolling-motion wheel” as the gear 236. These are not two separate elements but are in fact both a part of the same mechanism by which the sleeve 230 is manually rotated to rotate the gears 220, 224, 236 thus rotating the shaft 188, which, in turn, changes the orientation of the end effector 166. This rotational control pivots the end effector and does not rotate the end effector about any axis, as in accordance with the present invention. As described in column 10 of the patent, “Rotation of the sleeve 230 thus effects rotation of the gears 236, 224, and 220 to rotate the shaft 188. When the shaft 188 rotates, the orientation of the end effector 166 is changed as illustrated in FIGS. 10-13.”

In order to clarify the operation in accordance with the present invention claim 22 has been amended to recite that the rotation of the tool is about a distal tool roll axis. Support for this is found in Fig. 26 wherein rotation of the wheel 225 causes a corresponding rotation of the tool 223 about the distal tool roll axis 230. Accordingly, claim 22, as now amended, should be found in condition for allowance. Likewise the added claims 142-149 should also be allowed.

Claim 24 has been allowed. The added dependent claims 150-156 should thus also be in condition for allowance.

Claim 25 has been allowed. The added dependent claims 157-162 should thus also be in condition for allowance.

Claim 27 has been allowed. The added dependent claims 163-167 should thus also be in condition for allowance.

Claim 29 has been allowed. The added dependent claims 168-173 should thus also be in condition for allowance.

Claim 30 has been allowed. The added dependent claims 174-177 should thus also be in condition for allowance.

Claim 31 has been allowed. The added dependent claims 178-181 should thus also be in condition for allowance.

The applicant has also added new claims 182-186. The subject matter of claim 182 is believed to be patentably distinguishing over prior art that the Examiner has referenced. None of the patents show this combination which includes a linear actuator. Also dependent claim 183-186 should be allowable.

The applicant has also added new claim 187. The subject matter of claim 187 is believed to be patentably distinguishing over prior art that the Examiner has referenced. This claim recites subject matter similar to that found in allowed claim 27 and should thus be found allowable. Dependent claim 188-191 should also be found allowable

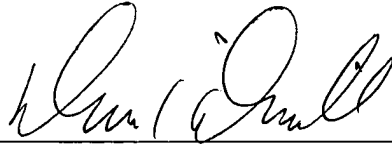
CONCLUSION

In view of the foregoing amendments and remarks, the Applicants respectfully submit that all of the claims pending in the above-identified application are in condition for allowance, and a notice to that effect is earnestly solicited.

If the present application is found by the Examiner not to be in condition for allowance, then the Applicants hereby request a telephone or personal interview to facilitate the resolution of any remaining matters. Applicants' attorney may be contacted by telephone at the number indicated below to schedule such an interview.

Respectfully submitted,
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